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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/961,431	09/25/2001	Gerd Jonas	214349US0CONT	7991

22850 7590 03/06/2003

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EXAMINER
BEFUMO, JENNA LEIGH

ART UNIT	PAPER NUMBER
1771	4

DATE MAILED: 03/06/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/961,431	JONAS ET AL.	
	Examiner	Art Unit	
	Jenna-Leigh Befumo	1771	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *25 September 2001* .

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *22-35* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *22-35* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☒ Certified copies of the priority documents have been received in Application No. *09/147,476* .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

DETAILED ACTION

Response to Amendment

1. Preliminary Amendment A, submitted as Paper No. 2 on September 25, 2001, has been entered. Claims 1 – 21 have been cancelled. Claims 22 - 35 have been added. Therefore, the pending claims are 22 – 35.

Priority

2. Applicant has not complied with one or more conditions for receiving the benefit of an earlier filing date under 35 U.S.C. 120 as follows:

> An application in which the benefits of an earlier application are desired must contain a specific reference to the prior application(s) in the first sentence of the specification or in an application data sheet (37 CFR 1.78(a)(2) and (a)(5)).

Claim Objections

3. Claim 32 is objected to because of the following informalities: the phrase "further made from crosslinker" is grammatically awkward. Appropriate correction is required.

4. Claim 34 is objected to because of the following informalities: the phrase "package captaining the absorbent insert" is grammatically awkward. The claim is examined as if the word "captaining" is "containing" instead. Appropriate correction is required.

5. Claim 35 is objected to because of the following informalities: the phrase "making an ice for a packaging application" is grammatically awkward. Appropriate correction is required.

Claim Rejections - 35 USC § 112

6. The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

7. Claims 22 – 31, 34, and 35 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

8. Claims 22 – 31, 34, and 35 are indefinite because they fail to set forth the composition or structure of the absorbent polymer and only claim properties of the $Q_{SAP3.0}$ and retention. Claims that merely set forth physical characteristics desired in an article, and not setting forth specific compositions which would meet such characteristics are invalid as vague, indefinite, and functional since they cover any conceivable combination of ingredients either presently existing or which might be discovered in the future. Ex parte Slob (PO BdApp) 157 USPQ 172.

In other words, since the claims only recite the properties produced by the absorbent polymer without, claiming the composition of the absorbent polymer, it is unclear what structure would meet the recited properties and thus, the scope of the claims is indefinite.

9. The phrase " the top and bottom covering layer comprise a plastic or cellulose film, a fabric or a fleece; and at least one part of the covering layer film is permeable to water" in claim 28 is indefinite. Is the Applicant limiting the covering layer to a water permeable film with the last limitation? Or, is the Applicant stating that if the covering layer is a film it must be a water permeable film? The claim is examined based on the second interpretation so that the covering layer is either a permeable film layer, a fabric layer, or a fleece layer.

10. The phrase "the core comprises fleece, a fiber, a fabric" in claim 29 is indefinite. Is the Applicant claiming that the core is a single fiber? Or, is the core a fibrous batting or wadding comprising loosely entangled fibers? Further it is noted that the Applicant needs to use "or" in the group list.

11. The phrase "within the core of fiber and fabric" in claim 30 is indefinite. Does the term "core" refer to the core layer of the absorbent material? Or, is the absorbent polymer placed within the fiber and fabric itself? And is the absorbent polymer within both the fiber and fabric at the same time?

Claim Rejections - 35 USC § 102

12. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
>
> (e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

13. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

14. Claims 22 – 27, 29, 30, 32 and 33 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Brehm et al. (5,672,633).

Brehm et al. is drawn to superabsorbent material comprising a) polymerizable acid-groups comprising neutralized monomers, b) polymerized unsaturated monomers which are copolymerizable with a, c) cross-linking agents, and d) a water-soluble polymer (abstract). The polymerizable acid groups are obtained from monomers of acrylic acid, methacrylic acid, or 2-acrylamido-2-methylpropane sulfonic acid (column 4, lines 36 – 40). The water-soluble polymer may be present as graft polymers (column 5, lines 5 – 7). Finally, Brehm et al. discloses that the absorbent polymers created in the examples have retention values of 35.5 and higher.

The absorbent polymer is used in absorbent articles including sanitary articles, diapers, and sanitary napkins, which inherently have a top layer and bottom layer surrounding the absorbent core layer (column 1, lines 18 – 20). The polymer can be used in the absorbent articles by mixing the polymer with paper, fluff pulp or synthetic fibers, or distributing the polymer between substrates made of paper, fluff, or non-woven textiles (column 5, lines 54 – 60). Thus, the absorbent material can be arranged in layers or mixed with fibers and fabric layers.

Although Brehm et al. does not explicitly teach the limitations $Q_{SAP3.0}$, absorption under pressure, soluble ratio, and migration value, it is reasonable to presume that said limitations are inherent to the invention. Support for said presumption is found in the use of similar materials (i.e. superabsorbent material made from a mixture of unsaturated monomer acid groups, a copolymerizable monomer, crosslinking agents, and a graft polymer) used to produce the superabsorbent polymer which can be used in absorbent articles. The burden is upon the Applicant to prove otherwise. *In re Fitzgerald*, 205 USPQ 594. In the alternative, the claimed limitations would obviously have been provided by the process disclosed by Brehm et al.. Note

In re Best, 195 USPQ 433, footnote 4 (CCPA 1977) as to the providing of this rejection under 35 USC 103 in addition to the rejection made above under 35 USC 102. Therefore, claims 22 – 27, 29, 30, 32, and 33 are rejected.

15. Claim 34 is rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Midkiff et al. (EP 0 353 334).

Midkiff et al. discloses an absorbent structure have a fluid permeable top sheet, a fluid impermeable bottom sheet and an absobent core containing superabsorbent material (abstract). The absorbent structure is used to absorb liquids from food products (column 1, lines 1 – 5). Further, Midkiff et al. discloses that the absorbent materials are packaged with food products to absorb excess liquid (column 1, lines 30 – 35).

Although Midkiff et al. does not explicitly teach the limitations $Q_{SAP3.0}$ and retention, it is reasonable to presume that said limitations are inherent to the invention. Support for said presumption is found in the use of similar materials (i.e. superabsorbent material in the core layer of an absorbent product with a top and bottom layer) used to produce the absorbent material packaged with food products. The burden is upon the Applicant to prove otherwise. *In re Fitzgerald*, 205 USPQ 594. In the alternative, the claimed limitations would obviously have been provided by the process disclosed by Midkiff et al.. Note *In re Best*, 195 USPQ 433, footnote 4 (CCPA 1977) as to the providing of this rejection under 35 USC 103 in addition to the rejection made above under 35 USC 102. Therefore, claim 35 is rejected.

16. Claim 35 is rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Dawson et al. (5,709,089).

Dawson et al. discloses a package containing a superabsorbent polymer placed within a liquid permeable pouch (abstract). The package can be used as a cooling package by adding water to the pouch and then freezing the pouch (column 1, lines 38 - 49).

Although Dawson et al. does not explicitly teach the limitations $Q_{SAP3.0}$ and retention, it is reasonable to presume that said limitations are inherent to the invention. Support for said presumption is found in the use of similar materials (i.e. superabsorbent material in the core layer of an absorbent product with a top and bottom layer) used to produce the frozen absorbent package. The burden is upon the Applicant to prove otherwise. *In re Fitzgerald*, 205 USPQ 594. In the alternative, the claimed limitations would obviously have been provided by the process disclosed by Dawson et al.. Note *In re Best*, 195 USPQ 433, footnote 4 (CCPA 1977) as to the providing of this rejection under 35 USC 103 in addition to the rejection made above under 35 USC 102. Thus, claim 35 is rejected.

Claim Rejections - 35 USC § 103

17. Claim 28 is rejected under 35 U.S.C. 103(a) as being unpatentable over Brehm et al. in view of Kellenberger (EP 0443 627 A2).

The features of Brehm et al. have been set forth above. While Brehm et al. discloses that the absorbent material can be used in diapers and sanitary napkins which inherently have top and bottom cover layers, Brehm et al. fails to teach what the cover layers are made from. Kellenberger et al. is drawn to absorbent materials comprising superabsorbent particles. Kellenberger et al. discloses that the absorbent structure includes containment layers which are joined together to form a compartment in which the superabsorbent material is stored (page 8, lines 6 – 7). At least one of the layers is liquid permeable and it can be made from woven or non-woven fabrics, perforated films, and fibrous webs (page 8, lines 8 – 10). Therefore, it would

have been obvious to one of ordinary skill in the art to use perforated film, woven or non-woven fabrics, or fibrous webs as taught by Kellenberger et al. as the outer layers of the absorbent product taught by Brehm et al. so that the liquid can be absorbed by the core layer and at the same time contain the superabsorbent material and the liquid within a confined area. Therefore claim 28 is rejected.

18. Claim 31 is rejected under 35 U.S.C. 103(a) as being unpatentable over Brehm et al. in view of Poccia et al. (5,100,397).

The features of Brehm et al. have been set forth above. While Brehm et al. discloses that the superabsorbent material can be mixed with various fibers and materials, Brehm et al. fails to teach that the fibers are hollow. Poccia et al. is drawn to an absorbent mixture comprising web structure having fibers mixed with absorbent particles (column 2, lines 25 – 39). Poccia et al. teaches that the fibers can be made from various material, but polyester fibers having a hollow core are preferred (column 4, lines 37 - 43). Therefore, it would have been obvious to one of ordinary skill in the art to use hollow fibers as the fibers in the absorbent core taught by Brehm et al. since Poccia et al. teaches the hollow fibers are the preferred type of fibers in the core layer and the hollow fibers will produce a lower weight fabric for the same size fibers as well as a less expensive fabric since less polymeric material is needed to produce hollow fibers. Thus claim 31 is rejected.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jenna-Leigh Befumo whose telephone number is (703) 605-1170. The examiner can normally be reached on Monday - Friday (9:00 - 5:30).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on (703) 308-2414. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9310 for regular communications and (703) 872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

Jenna-Leigh Befumo
February 25, 2003

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